

## **RAW SEQUENCE LISTING**

**The Biotechnology Systems Branch of the Scientific and Technical  
Information Center (STIC) no errors detected.**

Application Serial Number: 10/828,934  
Source: IFWQ  
Date Processed by STIC: 10/15/04

# ***ENTERED***



IFWO

## RAW SEQUENCE LISTING

PATENT APPLICATION: US/10/828,934

DATE: 10/15/2004

TIME: 10:35:43

Input Set : A:\Utmb1022.app

Output Set: N:\CRF4\10152004\J828934.raw

3 <110> APPLICANT: GORENSTEIN, DAVID G.  
 4 LUXON, BRUCE A.  
 5 KANG, JONGHOON  
 6 LEE, MYUNG SOOG  
 7 COPELAND III, JOHN ALTON  
 9 <120> TITLE OF INVENTION: COMBINATORIAL SELECTION OF PHOSPHOROTHIOATE  
 10 SINGLE-STRANDED DNA APTAMERS FOR TGF-BETA-1 PROTEIN  
 12 <130> FILE REFERENCE: UTMB:1022  
 14 <140> CURRENT APPLICATION NUMBER: 10/828,934  
 15 <141> CURRENT FILING DATE: 2004-04-21  
 17 <150> PRIOR APPLICATION NUMBER: 10/272,509  
 18 <151> PRIOR FILING DATE: 2002-10-16  
 20 <150> PRIOR APPLICATION NUMBER: 09/425,798  
 21 <151> PRIOR FILING DATE: 1999-10-25  
 23 <150> PRIOR APPLICATION NUMBER: 09/425,804  
 24 <151> PRIOR FILING DATE: 1999-10-25  
 26 <150> PRIOR APPLICATION NUMBER: 60/105,600  
 27 <151> PRIOR FILING DATE: 1998-10-26  
 29 <160> NUMBER OF SEQ ID NOS: 63  
 31 <170> SOFTWARE: PatentIn Ver. 3.2  
 33 <210> SEQ ID NO: 1  
 34 <211> LENGTH: 74  
 35 <212> TYPE: DNA  
 36 <213> ORGANISM: Artificial Sequence  
 38 <220> FEATURE:  
 39 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic  
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 42 <220> FEATURE:  
 43 <221> NAME/KEY: modified\_base  
 44 <222> LOCATION: (24)..(53)  
 45 <223> OTHER INFORMATION: a, t, c or g  
 47 <400> SEQUENCE: 1  
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 49 cgtgaagccg agcg 74  
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 53 <211> LENGTH: 23  
 54 <212> TYPE: DNA  
 55 <213> ORGANISM: Artificial Sequence  
 57 <220> FEATURE:  
 58 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic  
 59 oligonucleotide primer  
 61 <400> SEQUENCE: 2  
 62 cagtccggat gctctagagt gac 23

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67 <212> TYPE: DNA
68 <213> ORGANISM: Artificial Sequence
70 <220> FEATURE:
71 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
72     oligonucleotide primer
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78 <210> SEQ ID NO: 4
79 <211> LENGTH: 30
80 <212> TYPE: DNA
81 <213> ORGANISM: Artificial Sequence
83 <220> FEATURE:
84 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
85     oligonucleotide
87 <400> SEQUENCE: 4
88 tgtcgttggtg tcctgtaccc gccttgacca                       30
91 <210> SEQ ID NO: 5
92 <211> LENGTH: 30
93 <212> TYPE: DNA
94 <213> ORGANISM: Artificial Sequence
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97 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
98     oligonucleotide
100 <400> SEQUENCE: 5
101 tgtctcgatg ctagactcta tacccgccaa                        30
104 <210> SEQ ID NO: 6
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106 <212> TYPE: DNA
107 <213> ORGANISM: Artificial Sequence
109 <220> FEATURE:
110 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
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113 <400> SEQUENCE: 6
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117 <210> SEQ ID NO: 7
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119 <212> TYPE: DNA
120 <213> ORGANISM: Artificial Sequence
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123 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
124     oligonucleotide
126 <400> SEQUENCE: 7
127 tgtgtgtatg gtccttgcat cgattccctg                       30
130 <210> SEQ ID NO: 8
131 <211> LENGTH: 29
132 <212> TYPE: DNA
133 <213> ORGANISM: Artificial Sequence

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135 <220> FEATURE:
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137     oligonucleotide
139 <400> SEQUENCE: 8
140 tgtgtctatc gctgcaccgt gtccataca                29
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144 <211> LENGTH: 30
145 <212> TYPE: DNA
146 <213> ORGANISM: Artificial Sequence
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150     oligonucleotide
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153 gtgtgcgttg tctgtccgtt tcctgtccac                30
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158 <212> TYPE: DNA
159 <213> ORGANISM: Artificial Sequence
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163     oligonucleotide
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171 <212> TYPE: DNA
172 <213> ORGANISM: Artificial Sequence
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178 <400> SEQUENCE: 11
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188 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
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196 <211> LENGTH: 30
197 <212> TYPE: DNA
198 <213> ORGANISM: Artificial Sequence
200 <220> FEATURE:
201 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic
202     oligonucleotide
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Input Set : A:\Utmb1022.app

Output Set: N:\CRF4\10152004\J828934.raw

205 atcgctgact gtcctgtcac tgtccatcca 30  
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213 <220> FEATURE:  
214 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic  
215 oligonucleotide  
217 <400> SEQUENCE: 14  
218 tggaggtgcc tggatatatc gactcgaccc 30  
221 <210> SEQ ID NO: 15  
222 <211> LENGTH: 30  
223 <212> TYPE: DNA  
224 <213> ORGANISM: Artificial Sequence  
226 <220> FEATURE:  
227 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic  
228 oligonucleotide  
230 <400> SEQUENCE: 15  
231 gtgtccttgt ctgacctcga tacacgacac 30  
234 <210> SEQ ID NO: 16  
235 <211> LENGTH: 30  
236 <212> TYPE: DNA  
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241 oligonucleotide  
243 <400> SEQUENCE: 16  
244 tgtggcggtg actgtacacg tcgatacacc 30  
247 <210> SEQ ID NO: 17  
248 <211> LENGTH: 30  
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252 <220> FEATURE:  
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254 oligonucleotide  
256 <400> SEQUENCE: 17  
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260 <210> SEQ ID NO: 18  
261 <211> LENGTH: 30  
262 <212> TYPE: DNA  
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265 <220> FEATURE:  
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267 oligonucleotide  
269 <400> SEQUENCE: 18  
270 tgtagtgtcc tggctatcca cgtctccatt 30  
273 <210> SEQ ID NO: 19  
274 <211> LENGTH: 30  
275 <212> TYPE: DNA

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Input Set : A:\Utmb1022.app

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276 <213> ORGANISM: Artificial Sequence  
278 <220> FEATURE:  
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280     oligonucleotide  
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283 tggatcgctt atcgctcga tcattgccca 30  
286 <210> SEQ ID NO: 20  
287 <211> LENGTH: 30  
288 <212> TYPE: DNA  
289 <213> ORGANISM: Artificial Sequence  
291 <220> FEATURE:  
292 <223> OTHER INFORMATION: Description of Artificial Sequence: Synthetic  
293     oligonucleotide  
295 <400> SEQUENCE: 20  
296 ttgtgtgact ggcacgcct cgactcgctg 30  
299 <210> SEQ ID NO: 21  
300 <211> LENGTH: 41  
301 <212> TYPE: DNA  
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305 <223> OTHER INFORMATION: Description of Artificial Sequence: consensus  
306     oligonucleotide sequence  
308 <220> FEATURE:  
309 <221> NAME/KEY: modified\_base  
310 <222> LOCATION: (1)..(2)  
311 <223> OTHER INFORMATION: a, t, c or g  
313 <220> FEATURE:  
314 <221> NAME/KEY: modified\_base  
315 <222> LOCATION: (6)  
316 <223> OTHER INFORMATION: a, t, c or g  
318 <220> FEATURE:  
319 <221> NAME/KEY: modified\_base  
320 <222> LOCATION: (9)..(10)  
321 <223> OTHER INFORMATION: a, t, c or g  
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324 <221> NAME/KEY: modified\_base  
325 <222> LOCATION: (13)..(15)  
326 <223> OTHER INFORMATION: a, t, c or g  
328 <220> FEATURE:  
329 <221> NAME/KEY: modified\_base  
330 <222> LOCATION: (19)..(20)  
331 <223> OTHER INFORMATION: a, t, c or g  
333 <220> FEATURE:  
334 <221> NAME/KEY: modified\_base  
335 <222> LOCATION: (26)  
336 <223> OTHER INFORMATION: a, t, c or g  
338 <220> FEATURE:  
339 <221> NAME/KEY: modified\_base  
340 <222> LOCATION: (28)

RAW SEQUENCE LISTING ERROR SUMMARY  
PATENT APPLICATION: US/10/828,934

DATE: 10/15/2004  
TIME: 10:35:44

Input Set : A:\Utmb1022.app  
Output Set: N:\CRF4\10152004\J828934.raw

ase Note:

of n and/or Xaa have been detected in the Sequence Listing. Please review the  
Sequence Listing to ensure that a corresponding explanation is presented in the <220>  
<223> fields of each sequence which presents at least one n or Xaa.

#:1; N Pos. 24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40,41,42,43

#:1; N Pos. 44,45,46,47,48,49,50,51,52,53

#:21; N Pos. 1,2,6,9,10,13,14,15,19,20,26,28,30,31,32,35,40,41

#:59; N Pos. 11,20

**VERIFICATION SUMMARY**

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Input Set : A:\Utmb1022.app

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18 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 after pos.:0  
359 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:21 after pos.:0  
366 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:59 after pos.:0